

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/532,851	04/27/2005	Gert Callies	10191/3820	1950
²⁶⁶⁴⁶ KENYON & K	7590 . 05/02/200 ENYON LLP	EXAMINER		
ONE BROADV	VAY	PASCHALL, MARK H		
NEW YORK, NY 10004			ART UNIT	PAPER NUMBER
			3742	
		•		
			MAIL DATE	DELIVERY MODE
		·	05/02/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.



		Application	No.	Applicant(s)			
Office Action Summary		10/532,851	,	CALLIES ET AL.			
		Examiner		Art Unit			
	The MAII ING DATE of this communication ann	Mark H. Pas		3742			
Period fo	The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication. - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).							
Status				,			
1)🖂	Responsive to communication(s) filed on <u>01 February 2007</u> .						
2a)⊠	This action is FINAL . 2b) This action is non-final.						
3)[Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.							
Disposition of Claims							
4) Claim(s) 20-29 is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration. 5) Claim(s) is/are allowed. 6) Claim(s) 20-23 and 25-29 is/are rejected. 7) Claim(s) 24 is/are objected to. 8) Claim(s) are subject to restriction and/or election requirement.							
Application Papers							
10)	The specification is objected to by the Examine The drawing(s) filed on is/are: a) access Applicant may not request that any objection to the Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The specification is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to by the Examine The oath or declaration is objected to be a constant or declaration the oath or declaration is objected to be a constant or declaration the oath of the oath	epted or b) drawing(s) be lition is required	held in abeyance. See if the drawing(s) is obj	ected to. See 37 CFR 1.121(d).			
Priority under 35 U.S.C. § 119							
 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No. 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received. 							
Attachmen	t(s)						
1) Notice 2) Notice 3) Inform	the of References Cited (PTO-892) the of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO/SB/08) the No(s)/Mail Date	5	Interview Summary Paper No(s)/Mail Da Notice of Informal Pa	te			

Application/Control Number: 10/532,851

Art Unit: 3742

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

Claims 20-23,25-29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Durheim in view of Chang et al as applied to claims 10-16, 18, 19 above, and further in view of Richter et al (6,630,645). Durheim as modified by Chang et al teaches the claimed laser drilling system with a backing plate used against the workpiece. The claims call for a backing, which is tilted at a specific angle relative to the outlet opening of the workpiece. The patent to Richter et al is applied for teaching a

t: 3742

Page 3

laser drilling system with the angle of drilling through the work variable relative to the work. Thus the angle would also be variable relative to a stationary backing plate, as set forth in Durheim as modified. Use of a variable angle leads to more versatility in the drilling methods available to the apparatus and in view of this teaching it would have been obvious to modify the Durheim system further to include a variable angle laser Beam, to effect a more versatile method and system.

Note use of nitrogen and inert gases as the processing gases, as disclosed in the applied patents.

Allowable Subject Matter

Claim 24is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is a statement of reasons for the indication of allowable subject matter: the prior art of record does not teach controlling the impingement direction of the process gas as claimed.

Response to Arguments

Applicant's arguments filed 02-01-2007 have been fully considered but they are not persuasive. Applicant's remarks advance on page 4 that, "a backing is positioned relative to at least one of an outlet opening and a workpiece", as per the independent claims presented. The remarks proceed to set forth that the applied references do not

Art Unit: 3742

disclose nor suggest this teaching. However, use of a backing plate is conventional in laser drilling. Applicant is arguing that the applied references do not teach a tiltable backing plate. However, it is conventional in laser drilling to apply the laser beam at an angle to the workpiece. T state only that the backing plat is tiltable, "relative" to the hole drilled. This language does not preclude the backing plate as stationary and the angle of the laser driller relative to the work, is variable. Applicant's argument appear to be directed to the backing plate as tiltable, not the laser be as tiltable. As set forth above the term relative teaches both a tiltable backing plate and a tiltable laser beam relative to the work.

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Art Unit: 3742

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mark H. Paschall whose telephone number is 571 272-4784. The examiner can normally be reached on 7am - 3pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Robin Evans can be reached on 571-272-4777. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Mark H Paschall Primary Examiner Art Unit 3742

Mp

Application/Control Number: 10/532,851

Art Unit: 3742

Page 6